

REMARKS

Claims 1, 4, and 22 have been amended and claims 27-32 added. Upon entry of this amendment, claims 1, 4, 14-19, 22-26, and 27-32 will be pending in the above-identified application.

Amendments to the Claims

Support for the amendments to claims 1, 4, and 22 can be found throughout the specification, particularly at page 6, line 21, to page 7, line 11, and page 8, lines 3-6. No new matter has been added.

New Claims

Support for the new claims can be found throughout the specification, particularly at page 6, line 13, to page 7, line 11, and page 8, lines 3-6. No new matter has been added.

Objection

Applicants request the objection to claim 22 be withdrawn. One of the recitations of NiSi_2 has been deleted from the claim.

Section 102 - Inamasu

Applicants respectfully request reconsideration of the rejection of claims 1, 4, 14-19, and 22-26 under 35 U.S.C. § 102(b) as being anticipated by JP 10-312789 (Inamasu). As amended, each of claims 1, 4, 14-19, and 22-26 recites a non-aqueous electrolyte secondary cell comprising a cathode comprising $\text{Li}_x\text{Fe}_y\text{PO}_4$ having a particle diameter not greater than 1 micrometer, wherein $0 < x \leq 2$ and $1 \leq y \leq 2$, and an anode comprising a conductive agent including $\text{D}_s\text{E}_t\text{Li}_u$, wherein D is tin or silicon, E includes another element, Li is lithium, and $s > 0$, $t > 0$, and $u > 0$.

Inamasu discloses a non-aqueous battery comprising a negative electrode including an active material having an average grain size of 0.1-100 micrometers (see paragraph 0020) and silicon or germanium (see paragraph 0018). Inamasu does not

disclose a cathode comprising $\text{Li}_x\text{Fe}_y\text{PO}_4$ having a particle diameter not greater than 1 micrometer, wherein $0 < x \leq 2$ and $1 \leq y \leq 2$, and an anode comprising a conductive agent including $\text{D}_s\text{E}_t\text{Li}_u$, wherein D is tin or silicon, E includes another element, and $s > 0$, $t > 0$, and $u > 0$.

Because Inamasu fails to disclose every feature of the claims, the rejection is improper. Accordingly, Applicants respectfully request that the rejection be withdrawn.

Section 102 - Kamauchi

Applicants respectfully request reconsideration of the rejection of claims 4, 19, and 22-26 under 35 U.S.C. § 102(b) as being anticipated by U.S. Patent No. 5,705,296 (Kamauchi). As amended, each of claims 4, 19, and 22-26 recites a non-aqueous electrolyte secondary cell comprising a cathode comprising $\text{Li}_x\text{Fe}_y\text{PO}_4$ having a particle diameter not greater than 1 micrometer, wherein $0 < x \leq 2$ and $1 \leq y \leq 2$, and an anode comprising a conductive agent including $\text{D}_s\text{E}_t\text{Li}_u$, wherein D is tin or silicon, E includes another element, Li is lithium, and $s > 0$, $t > 0$, and $u > 0$.

Kamauchi discloses a lithium secondary battery comprising an anode including a material selected from a group including lithium, lithium alloys such as Li-Al, Li-Al-Mg, and Li-C, lithium-containing organic compounds such as polyparaphenylene, polyacetylene, polythiophene, or polyacene doped with lithium ion, and carbon materials doped with lithium ion. (see column 6, lines 15-23) Kamauchi does not disclose an anode comprising a conductive agent including $\text{D}_s\text{E}_t\text{Li}_u$, wherein D is tin or silicon, E includes another element, and $s > 0$, $t > 0$, and $u > 0$.

Because Kamauchi fails to disclose every feature of the claims, the rejection is improper. Accordingly, Applicants respectfully request that the rejection be withdrawn.

Section 102 - Yamada

Applicants respectfully request reconsideration of the rejection of claims 1, 4, 14-19, and 23-26 under 35 U.S.C. § 102(e) as being anticipated by U.S. Patent No. 6,632,566 (Yamada). As amended, each of claims 1, 4, 14-19, and 23-26 recites a non-aqueous electrolyte secondary cell comprising a cathode comprising $\text{Li}_x\text{Fe}_y\text{PO}_4$ having

a particle diameter not greater than 1 micrometer, wherein $0 < x \leq 2$ and $1 \leq y \leq 2$, and an anode comprising a conductive agent including $D_sE_tLi_u$, wherein D is tin or silicon, E includes another element, Li is lithium, and $s > 0$, $t > 0$, and $u > 0$.

Yamada discloses a non-aqueous electrolyte battery comprising a positive electrode active material containing a compound having an olivine structure and a negative electrode comprising an active material capable of doping/undoping lithium such as metal lithium, lithium alloys, an electrically conductive high polymer material doped with lithium, and a laminated compound, such as a carbon material or a metal oxide. (see column 4, lines 60-65) Yamada does not disclose a cathode comprising $Li_xFe_yPO_4$ having a particle diameter not greater than 1 micrometer, wherein $0 < x \leq 2$ and $1 \leq y \leq 2$, and an anode comprising a conductive agent including $D_sE_tLi_u$, wherein D is tin or silicon, E includes another element, and $s > 0$, $t > 0$, and $u > 0$.

Because Yamada fails to disclose every feature of the claims, the rejection is improper. Accordingly, Applicants respectfully request that the rejection be withdrawn.

Section 103 - Goodenough in view of Moriguchi

Applicants respectfully request reconsideration of the rejection of claims 1, 4, 14-19, and 23-26 under 35 U.S.C. § 103(a) as being unpatentable over WO 97/40541 (Goodenough) in view of U.S. 6,576,369 (Moriguchi). As amended, each of claims 1, 4, 14-19, and 23-26 recites a non-aqueous electrolyte secondary cell comprising a cathode comprising $Li_xFe_yPO_4$ having a particle diameter not greater than 1 micrometer, wherein $0 < x \leq 2$ and $1 \leq y \leq 2$, and an anode comprising a conductive agent including $D_sE_tLi_u$, wherein D is tin or silicon, E includes another element, Li is lithium, and $s > 0$, $t > 0$, and $u > 0$.

Goodenough discloses cathode materials for a secondary lithium battery. Moriguchi discloses a negative electrode material for lithium ion secondary batteries. Goodenough and Moriguchi, individually and in combination, fail to disclose or suggest a cathode comprising $Li_xFe_yPO_4$ having a particle diameter not greater than 1 micrometer, wherein $0 < x \leq 2$ and $1 \leq y \leq 2$, and an anode comprising a conductive

agent including $D_sE_tLi_u$, wherein D is tin or silicon, E includes another element, and $s > 0$, $t > 0$, and $u > 0$.

Because Goodenough and Moriguchi, individually and in combination, do not disclose or suggest every feature of the claims, the rejection is improper. Accordingly, Applicants respectfully request that the rejection be withdrawn.

Section 103 - Kamauchi in view of Moriguchi

Applicants respectfully request reconsideration of the rejection of claims 1 and 14-18 under 35 U.S.C. § 103(a) as being unpatentable over Kamauchi in view of Moriguchi. As amended, each of claims 1 and 14-18 recites a non-aqueous electrolyte secondary cell comprising a cathode comprising $Li_xFe_yPO_4$ having a particle diameter not greater than 1 micrometer, wherein $0 < x \leq 2$ and $1 \leq y \leq 2$, and an anode comprising a conductive agent including $D_sE_tLi_u$, wherein D is tin or silicon, E includes another element, Li is lithium, and $s > 0$, $t > 0$, and $u > 0$.

Kamauchi discloses a lithium secondary battery comprising an anode including a material selected from a group including lithium, lithium alloys such as Li-Al, Li-Al-Mg, and Li-C, lithium-containing organic compounds such as polyparaphenylene, polyacetylene, polythiophene, or polyacene doped with lithium ion, and carbon materials doped with lithium ion. (see column 6, lines 15-23) Moriguchi discloses a negative electrode material for lithium ion secondary batteries. Kamauchi and Moriguchi, individually and in combination, fail to disclose or suggest a cathode comprising $Li_xFe_yPO_4$ having a particle diameter not greater than 1 micrometer, wherein $0 < x \leq 2$ and $1 \leq y \leq 2$, and an anode comprising a conductive agent including $D_sE_tLi_u$, wherein D is tin or silicon, E includes another element, and $s > 0$, $t > 0$, and $u > 0$.

Because Kamauchi and Moriguchi, individually and in combination, do not disclose or suggest every feature of the claims, the rejection is improper. Accordingly, Applicants respectfully request that the rejection be withdrawn.

Conclusion

As Applicants believe the application is in condition for allowance, a favorable action and a Notice of Allowance are respectfully requested.

If the Examiner desires, Applicants welcome a telephone interview to expedite prosecution. As always, the Examiner is free to call the undersigned at the telephone number below.

Applicants believe there is no fee due at this time. However, the Commissioner is hereby authorized to deduct any deficiency or credit any overpayment to Deposit Account No. 19-3140.

Respectfully submitted,

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Date: August 16, 2006

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